

July 2010

# MILITARY TRAINING

## Army and Marine Corps Face Challenges to Address Projected Future Requirements



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Highlights of [GAO-10-720](#), a report to congressional committees

## Why GAO Did This Study

The Army's and Marine Corps' major training facilities—Army and Marine Corps combat training centers and Army mobilization training centers—have focused on training units for counterinsurgency missions in Iraq and Afghanistan. As troop levels decrease in Iraq and increase in Afghanistan, larger numbers of forces will be training for Afghanistan. To meet future requirements, the services plan to adjust training to train forces on a fuller range of missions. The House report to the National Defense Authorization Act for Fiscal Year 2010 directed GAO to report on any challenges the Department of Defense faces as it adjusts training capacities. GAO assessed the extent to which the Army and Marine Corps have (1) made adjustments at their major training facilities to support larger deployments to Afghanistan; and (2) developed plans to adjust training capacity to meet future requirements. GAO analyzed service training guidance, future training requirements, and related plans, and interviewed headquarters officials and personnel from the services' major training facilities.

## What GAO Recommends

GAO recommends the Army develop a risk-assessment and mitigation plan to address gaps in training capacity, and assess how it can maximize existing resources to conduct reserve-component training called for under its force generation model. DOD generally agreed with our recommendations.

[View GAO-10-720 or key components.](#)  
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## MILITARY TRAINING

### Army and Marine Corps Face Challenges to Address Projected Future Requirements

#### What GAO Found

Due to similarities in training requirements, the Army and Marine Corps did not need to make significant adjustments at their major training facilities to support the shift in operational priority from Iraq to Afghanistan. While the Army had to adapt training scenarios to more closely resemble the operating environment in Afghanistan, it did not have to adjust trainers, training ranges, and mock towns and villages as these are the same regardless of whether forces are preparing for missions in either Iraq or Afghanistan. Since the summer of 2009, the Marine Corps had withdrawn most of its forces from Iraq and shifted the focus of training at its combat training center to exclusively train forces for missions in Afghanistan. Like the Army, the Marine Corps noted that, because of similarities in training requirements, it had to make few adjustments beyond changing some cultural role players and signs in mock towns and villages to support its shift in focus from Iraq to Afghanistan.

The Army and Marine Corps face several challenges as they plan to broaden the scope and size of training rotations to meet future training requirements. The Army projects capacity shortfalls at its combat training centers as it seeks to train brigade combat teams to meet future requirements for both ongoing operations and full-spectrum operations—offensive, defensive, and stability operations. The Army has identified the need to conduct 36 to 37 annual training rotations for its brigade combat teams by fiscal year 2011; the centers can currently conduct 28 rotations a year. The Army is developing an exportable capability, expected to increase its capacity by 6 rotations each year when it reaches full operational capability in 2013. However, this will not be sufficient to meet the total projected requirements. To address the gap, the Army plans to give priority to deploying units. The Army has not completed an assessment to determine its full range of options for meeting future brigade combat team training requirements, or the risks associated with not conducting the desired number of training rotations. The Army's force generation model calls for smaller reserve-component units to train for both ongoing and full-spectrum operations, but the Army has not finalized its training strategy for these reserve-component forces. The Army has identified training requirements and locations where deploying forces will train for ongoing operations, but it has not determined where or when it will train its reserve-component contingency forces for full spectrum operations. The Army has the capacity to train 86,000 reserve-component personnel at its seven mobilization training centers each year. It is also conducting enhanced training at other locations, which could expand capacity. Until the Army finalizes its reserve-component training strategy it will not be able to determine whether it can leverage existing resources to meet future training requirements, or whether any excess reserve-component training capacity exists. In the future, the Marine Corps plans to expand training to allow larger numbers of forces to train together, but it lacks sufficient space at its combat training center. It is considering alternatives for acquiring land, ranging in size from approximately 131,000 to 200,000 acres, and expects to reach a decision by fiscal year 2012.

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## **Abbreviations**

ARFORGEN	Army Force Generation
CTC	Combat Training Center

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United States Government Accountability Office  
Washington, DC 20548

July 16, 2010

The Honorable Carl Levin  
Chairman  
The Honorable John McCain  
Ranking Member  
Committee on Armed Services  
United States Senate

The Honorable Ike Skelton  
Chairman  
The Honorable Howard McKeon  
Ranking Member  
Committee on Armed Services  
House of Representatives

Since 2003, the Army and Marine Corps have focused much of their training on preparing forces for counterinsurgency missions in Iraq and Afghanistan, training larger numbers of forces for Iraq. However, with the drawdown in Iraq and increase in troop levels in Afghanistan, the services are beginning to train more forces to deploy to Afghanistan. The high pace of operations in Iraq and Afghanistan and focus on counterinsurgency missions has affected the Army and Marine Corps' ability to train their forces for a fuller range of missions at their major training facilities—the Army's and Marine Corps' Combat Training Centers (CTC) and the Army's mobilization training centers for the Reserve and National Guard. Recognizing the uncertainty of future conflicts and the need for forces to have a broader range of skills, the Army and Marine Corps are beginning to make plans to adjust the training capacity<sup>1</sup>—such as the number of rotations<sup>2</sup> and related support—at their major training facilities to train forces for a fuller range of missions.

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<sup>1</sup>The Army's and Marine Corps' CTCs measure capacity by the number of training rotations that are conducted; the Army's mobilization training centers for the Reserve and National Guard measure capacity by the number of people that are trained. For the purpose of this report, we are defining training capacity as the maximum number of training rotations that can be conducted, or people that can be trained, on a sustainable basis.

<sup>2</sup>Training exercises, or rotations, at the Army's CTCs last for 18 to 25 days; training at the Army's mobilization training centers for the Reserve and National Guard lasts for 15 to 60 days, depending on the unit's mission. In the Marine Corps, training rotations last for 28 days.

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The House Armed Services Committee report to the Fiscal Year 2010 National Defense Authorization Act directed GAO to report on a number of military readiness issues, including any challenges DOD faces in adjusting training capacity and scope to support larger deployments to Afghanistan while still preparing forces for deployments to Iraq.<sup>3</sup> In April 2010, we issued a report on the consistency of combat skills training provided to Army and Marine Corps support forces,<sup>4</sup> and will report separately on other issues called for in the House report. For this report we evaluated (1) the extent to which the Army and Marine Corps have made adjustments at their major training facilities to support larger deployments to Afghanistan while still preparing forces for deployments to Iraq, and (2) the extent to which the Army and the Marine Corps have developed plans to adjust training capacity to meet future training requirements.

To assess the extent to which the Army and Marine Corps have made adjustments at their major training facilities to support larger deployments to Afghanistan—while still preparing forces for deployments to Iraq—we reviewed Army and Marine Corps training policy and guidance, and we interviewed headquarters service officials to discuss these documents. In focusing our review, we also identified the Army’s and Marine Corps’ major predeployment training facilities; specifically the locations at which these services are conducting final mission-rehearsal exercises that include live-fire training for units deploying in support of current operations in Iraq and Afghanistan.<sup>5</sup> For the Army we focused on active and National Guard brigade combat teams, which prepare and train for deployment at the Army’s maneuver CTCs. In addition, we focused on the Army’s mobilization training centers, where National Guard brigade combat teams that will be split into smaller units in theater conduct training.<sup>6</sup> Because smaller-sized reserve-component units also conduct predeployment training at the Army’s mobilization training centers for the Reserve and National Guard, we included these units in the scope of this

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<sup>3</sup>H.R. Rep. No. 111-166, at 293-94 (2009).

<sup>4</sup>GAO, *Military Training: Actions Needed to Further Improve the Consistency of Combat Skills Training Provided to Army and Marine Corps Support Forces*, [GAO-10-465](#) (Washington, D.C.: Apr.16, 2010).

<sup>5</sup>Mission-rehearsal exercises are the final collective-training event that units conduct prior to deployment.

<sup>6</sup>The U.S. Army Reserve does not have brigade combat teams.

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review.<sup>7</sup> We did not include active component units that do not train at maneuver CTCs since these units generally train at different locations—their home stations where they have training facilities and support. For the Marine Corps we focused on units training for deployment at its only CTC, at Twentynine Palms, California.

We obtained and reviewed information from the Army's and Marine Corps' major training facilities on the training they conducted in fiscal year 2009 and fiscal year 2010, through April. We interviewed officials at the selected locations of the services' major training facilities and at the installations where the Army's mobilization training centers for the Reserve and National Guard are located to discuss adjustments that they made to support larger deployment to Afghanistan while still training for operations in Iraq. Specifically, we held discussions with officials from all four of the Army's CTCs; the Marine Corps' only CTC, the Air Ground Combat Center, located at Twentynine Palms, California; and officials from the Army's seven mobilization training centers for the Reserve and National Guard where the Army currently conducts training and plans to conduct training in the future.<sup>8</sup> To determine the extent to which the Army and the Marine Corps have developed plans to adjust training capacity, we reviewed training guidance and strategies that provided information about future training requirements for the services, including the Army's force generation annex to its campaign plan and the Marine Corps' expeditionary brigade training requirements. We interviewed Army and Marine Corps officials to discuss the future training requirements and the available capacity at their major training facilities. We also examined existing Army and Marine Corps plans and strategies to adjust capacity to meet future training requirements. We did not evaluate the effectiveness of the training programs conducted at these locations.

We assessed the reliability of the data presented in this report. Specifically, with regard to capacity—the maximum number of training rotations that can be conducted, or people that can be trained, on a sustainable basis—we interviewed officials and obtained data from the Army's and Marine Corps' headquarters organizations. In addition, we

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<sup>7</sup>For the purpose of this review, we are referring to the reserve-component forces that conduct training at the Army's mobilization training centers, which range in size from two-person detachments to brigade combat teams that are split up in theater, as smaller units.

<sup>8</sup>In the past, the Army has used four additional mobilization training centers for predeployment training: Fort Bragg, Fort McCoy, Fort Sill, and Fort Stewart.



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interviewed officials and obtained data from the major training facilities to verify that these data were consistent with the data provided by the headquarters organizations. We found the data to be sufficiently reliable for the purposes of this report.

We conducted this performance audit from August 2009 to May 2010 in accordance with generally accepted government auditing standards. Those standards require that we plan and perform the audit to obtain sufficient, appropriate evidence to provide a reasonable basis for our findings and conclusions based on our audit objectives. We believe that the evidence obtained provides a reasonable basis for our findings and conclusions based on our audit objectives. Additional details on our scope and methodology are in appendix I.

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## Background

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### Types of Army and Marine Corps Training

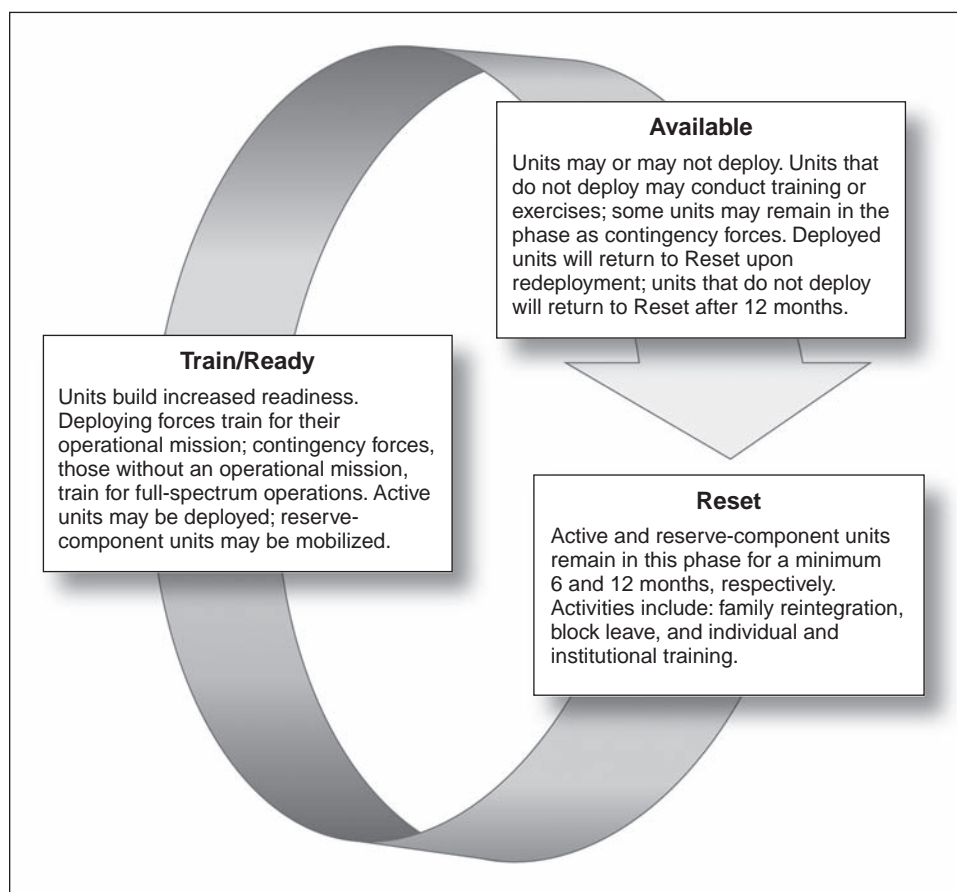
During initial entry training, recruits are trained on service tasks and skills, including basic military tactics, weapons training, and marksmanship. In addition, the services have annual training requirements that are focused on tasks such as crew-served weapons training, reacting to chemical and biological attacks, and offensive and defensive tactics. Prior to deploying overseas, units must also complete a set of service-directed predeployment training requirements, including a mission-rehearsal exercise.

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### Army Force Generation

The Army's Force Generation model (ARFORGEN) is a cyclical unit-readiness model that affects the types of training that units conduct during each phase. Through ARFORGEN, the Army builds the readiness of units as they move through three phases: *Reset*, *Train/Ready*, and *Available*. The Army uses these phases, which are described in figure 1, to prioritize resources and coordinate training, personnel, and equipment.

**Figure 1: Phases of ARFORGEN**



Source: GAO analysis of Army data.

As shown in figure 1, units entering the *Available* phase may or may not be deployed to conduct operational missions; units that are deployed in support of operations are known as deployed forces. Units in the *Available* phase that are not deployed are known as contingency forces. These units may conduct training or exercises with other services, governmental agencies, or military security forces from other nations. If units are deployed, they will return to the *Reset* phase upon redeployment—regardless of the length of deployment. If they are not deployed, units will return to the *Reset* phase after 12 months. There are no prescribed time lengths for one complete ARFORGEN cycle because the length of the cycle is driven by the length of active-component deployments, and reserve-component mobilizations. While current deployments are typically 12 months long, the Army has also used

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deployments of varying lengths, including 6 and 15 months, to support its ongoing operations. For the Army's active-component forces the ARFORGEN cycle is three times as long as its deployments, and for its reserve-component forces the cycle is five times as long as its mobilizations.

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## Army's and Marine Corps' Major Training Facilities and Approaches to Training

The Army maintains four CTCs: the Battle Command Training Program, Fort Leavenworth, Kansas; the National Training Center, Fort Irwin, California; the Joint Readiness Training Center, Fort Polk, Louisiana; and the Joint Multinational Readiness Center, Hohenfels, Germany. The Battle Command Training Program trains the command element of a unit.<sup>9</sup> The National Training Center, Joint Readiness Training Center, and the Joint Multinational Readiness Center, collectively referred to as the maneuver CTCs, train brigade combat teams—approximately 5,000 servicemembers—during rotations that last for 18 to 25 days.

Since 2003, the Army's maneuver CTCs have been conducting mission-rehearsal exercises for units prior to their deployments. Each training rotation is designed to challenge units and their leaders with the opportunity to face a well-trained opposing force, provide in-depth analyses of performance to units and their leaders, and create a realistic training environment, intended to closely parallel actual warfare, including live-fire training. Training rotations at the maneuver CTCs also include force-on-force training in a live, virtual, and constructive environment. As noted in appendix II, the Army's maneuver CTCs can conduct 28 training rotations annually for brigade combat teams. In addition to a brigade combat team, a CTC training rotation may also include Army support units and personnel or capabilities from other services and agencies.

In addition to the maneuver CTCs, the Army has seven mobilization training centers for the Reserve and National Guard that are operated by First Army—which is responsible for training mobilized reservists—that conduct predeployment training. This training ranges from 15 to 60 days for reserve-component units varying in size from small detachments—1 or 2 people—to brigade combat teams. Prior to deployment, units conduct mobilization and collective training at the Army's mobilization training centers for the Reserve and National Guard: Fort Dix, New Jersey; Camp

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<sup>9</sup>The Battle Command Training Program is not a maneuver CTC; it focuses on computer-assisted training exercises. Therefore, we did not include it in the scope of this review.

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Atterbury, Indiana; Fort Knox, Kentucky; Fort Bragg, North Carolina; Fort Stewart, Georgia; Camp Shelby, Mississippi; Fort Hood, Texas; Fort Bliss, Texas; Fort McCoy, Wisconsin; Fort Sill, Oklahoma; and Fort Lewis, Washington.<sup>10</sup>

Before 2008, all deploying brigade combat teams conducted training at an Army maneuver CTC prior to deployment. However, in 2008, due to the high operational tempos from the force increase in Iraq, and finite training capacities, the Army determined that reserve-component brigade combat teams that would be split into smaller units and assigned other missions, such as security forces, would conduct training at the Army's mobilization training centers. The brigade combat teams that would control battle space in theater, both active and reserve component, would conduct training at the maneuver CTCs.

We reported in July 2009 that capacity constraints had limited reserve-component access to facilities at certain Army mobilization training centers because they also were being used by active-component forces.<sup>11</sup> Around that time, First Army began to consolidate the Army's mobilization training centers for the Reserve and National Guard from 11 to 7. Specifically, First Army is retaining the locations that are owned by the reserve component or which have a dedicated training area for mobilizing reservists. These mobilization training centers will concentrate their efforts on training specific mission sets required for current operations while maintaining flexibility to support other missions in the future. As shown in appendix II, in fiscal year 2009, approximately 89,000 servicemembers were trained at the Army's mobilization training centers for the Reserve and National Guard.

The Marine Corps is organized into Marine Air-Ground Task Forces—which include headquarters, ground combat, logistics combat, and aviation combat elements—that train, exercise, and deploy as fully integrated combined-arms teams. At the Marine Corps' CTC, the Air Ground Combat Center at Twentynine Palms, California, battalion-sized units participate in a 28-day exercise that immerses units in an environment that is continuously updated and is designed to replicate the

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<sup>10</sup>In fiscal year 2009, the Army was still training deploying reserve-component forces at Fort McCoy, Fort Stewart, and Fort Sill.

<sup>11</sup>GAO, *Reserve Forces: Army Needs to Reevaluate Its Approach to Training and Mobilizing Reserve Component Forces*, [GAO-09-720](#) (Washington, D.C.: July 17, 2009).

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current operational conditions using mock urban villages, cultural role players, and equipment that will be employed in Afghanistan. The exercise includes two infantry battalions, a combat logistics battalion, and an aviation combat element in a single rotation that prepares Marines for the tactics and procedures they are expected to employ in Afghanistan. In addition, the Marine Corps will occasionally incorporate units from other services, such as the Air Force and Navy, and other nations to enhance the training experience.

The Marine Corps can conduct 6 training rotations per year at Twentynine Palms; in fiscal year 2009 it trained approximately 23,000 servicemembers. As of April 2010, the Marine Corps has trained approximately 9,800 servicemembers in support of missions in Afghanistan.

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## Prior Work

We have previously reported on the Army's approach to training and mobilizing its reserve component.<sup>12</sup> In July 2009, we reported that although the Army was exploring and had several initiatives underway to address training constraints, it had not identified the total requirements with its reserve-component training strategy. We recommended that the Army determine the range of resources and support that are necessary to fully implement its reserve-component training strategy. DOD partially agreed with our recommendation, however, as of May 2010, the Army had not identified the total requirements to fully implement its reserve-component training strategy.

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## Army's and Marine Corps' Major Training Facilities Require Few Adjustments to Support Force Increase in Afghanistan

The Army and Marine Corps have shifted their operational priority from Iraq to Afghanistan; however, few adjustments were required at the Army's major training facilities for a number of reasons, including the similarities in the Army's training requirements for both operations. In addition, since summer 2009, the Marine Corps has been preparing most of its forces for missions in Afghanistan at its CTC at Twentynine Palms.

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<sup>12</sup> [GAO-09-720](#).

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## Similarities in Army Predeployment Requirements and Related Support Result in Few Needed Changes at the Army's Major Training Facilities

Initially, the Army published separate predeployment training guidance for forces deploying in support of operations in Iraq and operations in Afghanistan. However, in September 2007, the guidance was combined into one document<sup>13</sup> because there were only small differences in the required training tasks for the two operations.<sup>14</sup> Because of the similarities in requirements, the Army has had to make few adjustments at its major training facilities to support the increase in forces deploying to Afghanistan.

For example, maneuver CTCs have continued to train the same types of units—brigade combat teams—as the Army has increased its forces in Afghanistan and reduced its forces in Iraq. The Army's maneuver CTC and mobilization training centers for the Reserve and National Guard, which have dedicated opposing forces<sup>15</sup> and trainers, use these same groups to train and prepare forces for missions in either Iraq or Afghanistan. These major training facilities also use the same training ranges, mock towns and villages, and instrumentation to train for both operations. Officials noted that they do not change much of the physical appearance of the training area except for village names and signs within the mock towns and villages to ensure that the proper language is displayed.

While the equipment used in training varies somewhat for forces deploying to Iraq and Afghanistan, according to officials, these differences have required only minimal adjustments and have not affected the mission-rehearsal exercises or number of training rotations being conducted. For example, the types of Mine Resistant Ambush Protected vehicles that troops train on may vary due to the differing terrain between the two operations. In Afghanistan units use a lighter-weight all-terrain-capable version of the Mine Resistant Ambush Protected vehicles better suited for the uneven terrain and subpar road conditions, whereas in Iraq units use a heavier version of the vehicles. According to Army officials, the maneuver CTCs currently do not have the number of all-terrain-capable Mine

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<sup>13</sup>U.S. Army Forces Command, *Pre-deployment Training Guidance for Follow-on Forces Deploying In Support Of Southwest Asia* (Oct. 27, 2009).

<sup>14</sup>Training requirements for overseas operations are constantly being generated, in part through lessons learned obtained in theater and after-action reports developed during and after deployment.

<sup>15</sup>The role of the opposing force is to replicate the threat in the contemporary operating environment. While the mobilization training centers for the Reserve and National Guard have a dedicated cadre for the opposing force, they do not have specific authorizations for these positions.

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Resistant Ambush Protected vehicles that they prefer for enhancing collective training; the majority of these vehicles currently are being deployed to Afghanistan. Therefore, the available vehicles are primarily being used at the maneuver CTCs to support individual training tasks required prior to deploying for operations in Afghanistan. As we previously reported, in instances when units lack the equipment to train on a task prior to deployment, they are supposed to receive the required training after they deploy.<sup>16</sup>

Army officials stated that the biggest change in adapting from Iraq to Afghanistan is in the training scenarios that are used during the rotations. For example, forces deploying to both Iraq and Afghanistan are provided training on counter-improvised explosive devices; however, differences in how the devices are being used in the two countries result in slightly different training scenarios. Although the development of the initial training scenarios for Afghanistan took several months, once the scenarios are developed, they can be tailored for each unit 180 days prior to the unit arriving at one of the Army's major training facilities. In addition, officials noted that the types of cultural role players participating in these scenarios were also different. For example, regarding languages for Iraq, role players in training scenarios speak Arabic; for Afghanistan, they speak Dari and Pashtu.

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### Few Adjustments Required at the Marine Corps Training Facility

From 2003 to 2009, the Marine Corps had a significant number of forces in Iraq. With the drawdown of forces in Iraq, however, the Marine Corps has shifted its focus to missions in Afghanistan; as of the summer of 2009, the Marine Corps was conducting limited training for missions in Iraq at its CTC at Twentynine Palms.

Like the Army, the Marine Corps, because of similarities in training requirements, had to make few adjustments at Twentynine Palms to support its shift in focus from Iraq to Afghanistan. For example, the Marine Corps uses the same training ranges, trainers, and mock towns and villages as it did when training forces for Iraq. However some modifications, such as changes to the signs in the mock towns and villages and the addition of Afghan role players, have been made to better replicate the current environment.

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<sup>16</sup> [GAO-10-465](#).

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## The Army and Marine Corps Face Challenges in Adjusting Training Capacity to Meet Their Identified Future Requirements

The Army and Marine Corps face challenges as they look to broaden the scope and size of their training rotations in the future. The Army projects capacity shortfalls at its maneuver CTCs to meet its identified future requirements to train brigade combat teams for both continuing operations and a broader range of offensive, defensive, and stability operations. Further, the Army has not developed a plan to use its existing training capacity to meet these full-spectrum training requirements for its smaller reserve-component units. In addition, the Marine Corps estimates that it does not have sufficient training capacity to meet future large-scale training requirements at its major training facility; however, it is pursuing a land acquisition to meet its requirements.

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## The Army Has Identified the Need for Extra Capacity by Fiscal Year 2011

As outlined in the Army Training Strategy,<sup>17</sup> the ARFORGEN process calls for brigade combat teams to conduct training rotations at the maneuver CTCs.<sup>18</sup> To support this process, the Army has identified the need to conduct 36 to 37 brigade combat team rotations annually. Seventy-two of the Army's 73 brigade combat teams will conduct their rotations at the maneuver CTCs.<sup>19</sup> The timing of units' rotations will depend on many factors, including their component and location.

Specifically, the ARFORGEN process calls for most of the Army's active component brigade combat teams to conduct two maneuver CTC rotations during each ARFORGEN cycle. The first rotation will occur following the *Reset* phase and units will focus on their core missions by conducting full-spectrum operations training that includes offensive, defensive, and stability operations or homeland operations. The second rotation will occur at the end of the unit's *Train/Ready* phase and will focus on either the unit's deployment mission—if the unit has been designated for deployment—or on its core missions if the unit has not been scheduled to deploy and has instead been designated as a contingency force.

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<sup>17</sup>Department of the Army, Office of the Deputy Chief of Staff, G-3/5/7, *Army Training Strategy* (Nov. 10, 2009).

<sup>18</sup>Modular combat brigades will have one of three standard designs—heavy brigade, infantry brigade, or Stryker brigade. The Army plans to have reconfigured its total force into the modular design, at which time it will have 73 modular brigade combat teams—45 in the active component and 28 in the Army National Guard.

<sup>19</sup>U.S. Forces Korea brigade combat team does not receive a maneuver CTC rotation; therefore, the Army does not include this unit when identifying the required annual number of CTC rotations.



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The ARFORGEN process calls for reserve-component brigade combat teams to conduct one maneuver CTC rotation during their ARFORGEN cycle. Due to their part-time status following deployments, Army National Guard brigade combat teams will go into the *Reset* pool for 12 months—twice as long as active brigade combat teams. As units move into the available pool after completing the *Train/Ready* phase of ARFORGEN, they will conduct a maneuver CTC rotation. If the unit is scheduled to deploy, its rotation will focus on the deployed mission. If the unit is designated a contingency force, its rotation will focus primarily on full-spectrum operations.

Under ARFORGEN, forward-deployed brigade combat teams in Europe, with ready access to the maneuver CTC in Germany, will conduct a CTC rotation every year regardless of which phase of the ARFORGEN cycle the unit is in. The brigade combat team in Korea, which is thousands of miles from the nearest maneuver CTC, will not conduct a maneuver CTC rotation and will conduct all of its training in Korea.

Based on its projected tempo of operations in fiscal year 2011—12-month deployments and goals of 1:2 active component and 1:4 reserve component time-deployed to time-at-home ratios—the Army has identified the need to conduct 36 to 37 training rotations, as displayed in table 1. In addition, the table highlights—under different deployment scenarios—the effect that the ARFORGEN model’s inputs can have on the number of maneuver CTC rotations that are needed. Specifically, table 1 shows different deployment periods, ranging from 6 to 15 months,<sup>20</sup> and the number of maneuver CTC rotations required for each example. The examples in table 1 are meant to be illustrative; we did not reach any conclusions regarding these scenarios and recognize that the Army must consider many factors in determining the length of deployments.

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<sup>20</sup>While current deployments are typically 12 months long, the Army has also used deployments of varying lengths, including 6 and 15 months, to support its ongoing operations.

**Table 1: Current and Potential Army Maneuver CTC Training Rotation Requirements Based on Force Generation Cycle**

	<b>Goal: 12-month deployment</b>	<b>Example A: 12-month deployment</b>	<b>Example B: 6-month deployment</b>	<b>Example C: 15-month deployment<sup>a</sup></b>
<b>Active component</b>				
Active-component ratio, time-deployed to time-at-home	1:2	1:3	1:3	1:3
Length of complete active-component ARFORGEN cycle (years)	3	4	2	5
Active-component rotations in ARFORGEN cycle (40 brigade combat teams, 2 rotations per cycle)	80	80	80	80
Number of active-component rotations required per year (cycle rotations / length of cycle)	27	20	40	16
<b>Reserve component</b>				
Reserve-component ratio, time-deployed to time-at-home	1:4	1:5	1:5	1:5
Length of complete reserve-component ARFORGEN cycle (years)	5	6	3	6
Reserve-component rotations in ARFORGEN cycle (28 brigade combat teams, 1 rotation per cycle)	28	28	28	28
Number of reserve-component rotations required per year (cycle rotations / length of cycle)	5-6	4-5	9-10	4-5
<b>Brigade combat teams outside of the United States</b>				
4 active-component brigade combat teams, Europe (1 rotation per year)	4	4	4	4
1 active-component brigade combat team, Korea <sup>b</sup>	0	0	0	0
<b>Total rotations required annually for 73 Army brigade combat teams</b>	<b>36-37</b>	<b>28-29</b>	<b>53-54</b>	<b>24-25</b>

Source: Department of the Army.

<sup>a</sup>Due to the 12-month mobilization policy, the ARFORGEN cycle for the reserve component will remain 60 months.

<sup>b</sup>The brigade combat team in Korea will not conduct a maneuver CTC rotation; it will conduct all of its training in Korea.

As shown in table 1, adjusting either the deployment length or time-deployed to time-at-home ratios can affect the required number of maneuver CTC rotations. Army officials have stated that while the current goal is time-deployed to time-at-home ratios of 1:2 for the active component and 1:4 for the reserve component, the Army would like to

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eventually get to a ratio of 1:3 for the active component and 1:5 for the reserve component. Example A in table 1 shows that if deployments remained constant at 12 months but the Army was able to achieve the desired longer times at home it would reduce its required CTC rotations to 28 or 29 each year. Examples B and C are presented simply to illustrate the effect of various deployment lengths, which the Army has used in the past, on the number of required training rotations.

The Army's maneuver CTCs cannot fully support the number of rotations called for by ARFORGEN—36 to 37 rotations.<sup>21</sup> As of May 2010, the Army's maneuver CTCs can currently conduct 28 brigade combat team training rotations per year—the National Training Center can conduct 10 rotations, the Joint Readiness Training Center can conduct 10 rotations, and the Joint Multinational Readiness Center can conduct 8 rotations. However, the Joint Multinational Readiness Center's role in Europe is not limited to providing maneuver CTC rotations to U.S. Army brigade combat teams; the Joint Multinational Readiness Center is currently using 4 of its 8 annual training rotations to train multinational partners. Unless the Joint Multinational Readiness Center uses its entire capability—to conduct 8 annual training rotations—to train U.S. Army brigade combat teams, the Army will train less than 28 brigade combat teams each year.

According to Army officials at the maneuver CTCs, the maneuver CTCs could surge to conduct up to 32 rotations in one year but this level is not sustainable for an extended period because it does not provide enough time between rotations to properly maintain equipment and vehicles.<sup>22</sup> Further, the trainers—both observer controller/trainers and opposing forces, who normally work 7 days per week when units are conducting their 18-to-25-day maneuver CTC rotations—do not have enough time to recover between rotations.

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<sup>21</sup>GAO, *Military Training: Actions Needed to More Fully Develop the Army's Strategy for Training Modular Brigades and Address Implementation Challenges*, [GAO-07-936](#) (Washington, D.C.: Aug. 6, 2010).

<sup>22</sup>Army officials said that, if necessary to support a short-term surge, the National Training Center and the Joint Readiness Training Center could both conduct 11 rotations in a year. They also expect the Joint Multinational Readiness Center to be able to conduct 10 rotations, if necessary to support a surge requirement, but they noted that the Joint Multinational Readiness Center has never actually conducted 10 rotations.

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## Planned Exportable Training Capabilities Would Add Flexibility and Capacity, but Would Not Fully Address Projected Capacity Shortfalls

According to the Army Training Strategy,<sup>23</sup> one of the Army's goals is to develop sufficient maneuver CTC capacity to support the ARFORGEN training cycle for deploying and contingency brigade combat teams by the end of fiscal year 2012. To better meet the Army's demand for maneuver CTC rotations and to generate trained and ready forces to conduct full-spectrum operations, the Army has developed an Exportable Training Capability at the Joint Multinational Readiness Center and is developing an Exportable Training Capability at the National Training Center. The Exportable Training Capabilities, which are mobile units of trainers and equipment, will travel to any of 15 designated training areas. Plans call for this training to be focused on full-spectrum operations for brigade combat teams as they transition from the *Reset* to the *Train/Ready* phase of ARFORGEN.

The Exportable Training Capability Operational and Organizational Plan Coordinating Draft, dated February 28, 2007, states that the exportable capability training is better than the training a unit could conduct at home station without external support, although not as robust as the training conducted at the static maneuver CTC locations. For example, the Exportable Training Capability cannot provide an in-depth level of after-action reporting, and it will not conduct live-fire exercises. In addition, while the maneuver CTCs have a robust, dedicated opposing force that is used during training, the Exportable Training Capabilities will rely on other units to provide a portion of the opposing force resources. According to this same draft operational and organizational plan, in the event of a surge the Exportable Training Capability must be prepared to conduct mission-rehearsal exercises in support of deploying units.

The Army initially planned to develop three Exportable Training Capabilities—one at the National Training Center, one at the Joint Readiness Training Center, and one at the Joint Multinational Readiness Training Center. However, due to personnel constraints, the Army was only able to develop the Exportable Training Capabilities at the Joint Multinational Readiness Center and the National Training Center. The Army designated the Joint Multinational Readiness Center as a dual-mission Exportable Training Capability because it already had employed its mobile capability to a limited extent into Eastern Europe to conduct training with multinational partners and had the necessary capabilities to perform as a mobile capability. In March of 2009 the Joint Multinational

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<sup>23</sup>Department of the Army, *Army Training Strategy*.

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Readiness Center–Exportable Training Capability deployed to Fort Bragg, North Carolina, and conducted a “proof of principle” for this concept by conducting a training rotation for a brigade combat team from the 82nd Airborne Division. With this deployment, the Joint Multinational Readiness Center–Exportable Training Capability demonstrated that it has increased flexibility, which could be used to help the Army conduct 28 U.S. Army brigade combat team rotations by conducting its normal 4 rotations at Hohenfels, Germany, for the brigade combat teams in Europe and by deploying to the United States to conduct four additional rotations for Army brigade combat teams.

The Exportable Training Capability at the National Training Center would increase the Army’s training rotation capacity for brigade combat teams and is expected to conduct exportable training at one of the designated training areas at the same time that training is being conducted at the National Training Center at Fort Irwin. At full capability, this training capability is expected to be able to conduct 6 rotations annually, which would increase the annual maneuver CTC training capacity from 28 to 34 rotations. The National Training Center’s Exportable Training Capability was initially scheduled to reach its full operational capability in 2010, but, as we reported in 2007, the Army was unable to meet its timelines due to personnel shortfalls caused by the Army’s current commitments to ongoing operations.<sup>24</sup> The Army currently is projecting that its National Training Center–Exportable Training Capability will reach its initial operating capability in fiscal year 2012 and full operating capability in fiscal year 2013.

If the Army is to reach its new goal for full operating capability in fiscal year 2013, it will need to fill about 300 military positions that are required for the National Training Center–Exportable Training Capability. To prepare for the initial training event in October 2011, the Army needs to fill 30 critical personnel positions in the operations group—which includes planners for the exportable capability—by September 2010. As of April 2010, the Army had filled 13 of these critical positions. The remaining 17 positions are for mid-level officers, who are in short supply throughout the entire Army and in the Army’s maneuver CTCs’ existing operations groups. According to Army officials, if all 30 of the critical personnel positions are

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<sup>24</sup> [GAO-07-936](#). At the time, Army officials stated that the personnel needed to fill key positions were not available because of the increase in the length of combat tours, the number of brigade combat teams needed to support the 2007 surge to Iraq, the increase in the number of brigade combat teams, and the need for advisors for Afghan and Iraqi forces.

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not filled by September 2010, the Army will potentially miss its operational timeline for conducting its initial training rotation, which has already slipped once. Officials at the maneuver CTCs noted that they expect to see an improvement in the filling of these positions with a recent transfer of responsibility for the operations groups from the U.S. Army Training and Doctrine Command to U.S. Army Forces Command but still expressed concerns about whether they would meet the September 2010 deadline for filling the 30 critical personnel positions.<sup>25</sup> These officials said they eventually expect to see improvements in the filling of these positions with the continued drawdown in Iraq and the increased time at home of servicemembers.

To meet its goal of conducting 6 training rotations, the Exportable Training Capability at the National Training Center will also have to overcome a number of support challenges. For example, the exportable capability will have to rely on the designated training areas for support. Specifically, the training areas will have to fund the initial start-up costs for facilities or support infrastructure required by the Exportable Training Capability. Further, the designated training areas will have to provide administrative support, and the unit conducting training may have to provide trainers for the exportable capability.

Even if the Army is able to use the Exportable Training Capabilities as projected and conduct 34 training rotations of various levels each year beginning in fiscal year 2013, the Army projects that it will fall short of the 36 to 37 rotations it expects to need to train brigade combat teams. To help address its training capacity shortfalls, the Army has developed a list that prioritizes the scheduling of units training at its maneuver CTCs. The list assigns first priority to deploying units, followed by the global response force / CBRNE (chemical, biological, radiological, nuclear, and high-yield explosives) consequence-management reaction force. Lower priority is assigned to units conducting full-spectrum operations mission-essential tasks and security forces.

However, the Army has not assessed the risks associated with its inability to conduct the desired number of brigade combat team training rotations

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<sup>25</sup>In October 2009, the Army Chief of Staff approved the transfer of responsibilities for the National Training Center and the Joint Readiness Training Center observer controller/trainers from U.S. Army Training and Doctrine Command to U.S. Army Forces Command. U.S. Army Europe retained responsibility for the observer controller/trainers at the Joint Multinational Readiness Center.

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and has not developed a mitigation plan that identifies a full range of available options for addressing the risks of not conducting the desired numbers of rotations, within its current resource levels. Without such a plan, the Army's brigade combat teams face uncertainties concerning their ability to conduct CTC rotations or receive support from the Exportable Training Capability and will need to conduct some type of alternative training.

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### The Army Continues to Develop Its Training Needs for the Reserve Component to Support ARFORGEN

In recent years, the Army has relied heavily on its reserve-component forces<sup>26</sup> to meet operational demands in Iraq and Afghanistan. As described in the 2010 Army Posture Statement, as the Army looks to the future it must retrain soldiers, leaders, and units to build critical skills necessary to operate across the full spectrum of operations.<sup>27</sup> Further, the Army expects that its units will be prepared through the ARFORGEN model to support both the current operation and a broader range of missions that could arise outside of the U.S. Central Command area of responsibility.

As we have previously reported, agencies need to consider how their training strategy works in conjunction with other already-established program initiatives and develop mechanisms that effectively limit unnecessary overlap and duplication of effort to enhance the execution of that training strategy.<sup>28</sup> Furthermore, in the Army Training Strategy, the Army indicated that the service should, to the extent possible, leverage existing training resources and use innovative training methods to reduce overhead.<sup>29</sup> It will also enable the reserve component to establish a training strategy that increases premobilization readiness, and provide for seamless transition from premobilization to postmobilization and the

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<sup>26</sup> Army National Guard brigade combat teams that deploy for brigade combat team missions conduct their predeployment training at the Army's maneuver CTCs. Other reserve component units, including Army National Guard brigade combat teams that are split up to perform other missions in theater, conduct their predeployment training at the Army's mobilization training centers. Throughout this report we refer to the units that train at the mobilization training centers as smaller reserve-component units.

<sup>27</sup> Secretary of the Army John M. McHugh and Chief of Staff of the Army General George W. Casey Jr., statement to the Committees and Subcommittees of the United States Senate and House of Representatives (February 2010).

<sup>28</sup> GAO, *Human Capital: A Guide for Assessing Strategic Training and Development Efforts in the Federal Government*, [GAO-04-546G](#) (March 2004).

<sup>29</sup> Department of the Army, *Army Training Strategy*.

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flexibility to provide training to contingency forces within the ARFORGEN cycle.

In preparation for their deployments, the Army currently trains its smaller reserve-component units at its mobilization training centers. As the Army plans to meet its future requirements, its plans call for continuing to train its smaller reserve-component forces at its seven mobilization training centers. Prior to attending training at the mobilization training centers these smaller units may receive training at the Army Reserve's Combat Support Training Center, located at Fort Hunter Liggett, California, or with the Army National Guard's exportable training capability that it refers to as the Home Station Culminating Training Event.<sup>30</sup>

While the Army has identified its training requirements for its smaller reserve-component units that are scheduled to deploy in support of ongoing operations, the Army is still refining the training requirements for its smaller reserve-component units that will serve as contingency forces. Although the Army's ARFORGEN requirements call for these units to be trained to operate across the full-spectrum of operations, the Army has not decided where these smaller units will conduct their collective training exercises in support of ARFORGEN. However, the Army has existing training locations that could be utilized to provide this training. For example, a recent First Army preliminary review indicates that it can train and support approximately 86,000 reserve-component servicemembers annually at the seven mobilization training centers. In addition to the Army's mobilization training centers, the Army could also utilize the training capacity at the Army National Guard's Home Station Culminating Training Event or the Army Reserve's Combat Support Training Center. These training venues provide units with external equipment, resources, and trainers at a level above what normally could be provided at the units' home stations. In addition, these training venues make available the external support that assists units with their ability to conduct training for both current and full-spectrum operations.

As of April 2010 the Army had not finalized its training strategy, including where its smaller contingency forces will conduct training. Furthermore, the Army lacks a complete assessment that outlines how its existing training capacity can best support its smaller units. Without a complete

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<sup>30</sup>In 2009, the Army National Guard renamed its Exportable Combat Training Capability the Home Station Culminating Training Event.



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assessment, the Army will be unable to determine if it can leverage its existing training capacity to meet its future training requirements for its smaller units or whether any excess reserve-component training capacity exists.

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### The Marine Corps Is Reviewing Options to Acquire More Land at Twentynine Palms to Meet Its Future Training Requirement

Currently, the Marine Corps trains its forces at Twentynine Palms before they deploy to Afghanistan. However, Marine Corps officials, citing lessons from operations in Iraq and Afghanistan and themes outlined in the 2008 Marine Corps Vision and Strategy 2025,<sup>31</sup> identified the need to train Marine Expeditionary Brigades, about 15,000 Marines, as an integrated combat team in large-scale training exercises.<sup>32</sup> The Marines currently lack the training capacity to conduct this training.

In 2004, at the request of the Marine Corps, the Center for Naval Analyses conducted a study to identify expeditionary brigade training requirements and the region that could best support these requirements.<sup>33</sup> The study reviewed three regions: the Southwestern United States, which includes the Twentynine Palms training facility, the Middle Atlantic Coast, and the north coast of the Gulf of Mexico.<sup>34</sup> The study's authors concluded that while all three locations could support some form of Marine Expeditionary Brigade-level, live-fire and maneuver training, there was no Department of Defense range that could provide sufficient space for Marine Expeditionary Brigades to conduct sustained combined-arms, live-fire and maneuver training. They further concluded that the Southwestern United States provided the best training area for an expeditionary training brigade but found that this level of training could only be fully conducted with an expansion of the training ranges and airspace at Twentynine Palms.

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<sup>31</sup>The 2008 Marine Corps Vision and Strategy 2025 provides direction for the Marine Corps to meet the challenges of an uncertain security environment.

<sup>32</sup>In general, the Marine Expeditionary Brigade is made up of three battalion task forces—a logistics element, an aviation combat element, and a command element. It is employed for mid-sized to smaller contingencies and is capable of responding to the full range of crises, from humanitarian assistance to forcible entry.

<sup>33</sup>Center for Naval Analysis, *MEB Training Exercise Study: Final Report* (December 2004).

<sup>34</sup>In addition to Twentynine Palms, the Southwest training area includes Camp Pendleton and the Yuma Training Range Complex; the Middle Atlantic Coast includes the area around Camp Lejeune and Cherry Point, North Carolina; and the Gulf of Mexico training area is located around Eglin Major Test Range and Facility Base on the north coast of the Gulf.

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In 2006, the Marine Corps validated the need for a large-scale Marine Expeditionary Brigade training exercise and approved the need for a training area and facility to conduct realistic training for all elements of the expeditionary brigade. In 2009, the Marine Corps validated training objectives for the exercise and established a minimum threshold that all training has to meet. These requirements call for at least two battalion task forces to converge on a single objective.

After receiving approval from the Office of the Secretary of Defense to pursue the establishment of airspace and land acquisition at Twentynine Palms, the Marine Corps identified six alternatives that, at a minimum, meet the training threshold. The six alternatives for land acquisition range in size from approximately 131,000 to 200,000 acres. In addition, the Marine Corps has also identified a “no-action alternative” which would provide no additional land or airspace in support of the new training requirement. According to officials, if the Marine Corps is not able to acquire land, the threshold level of training will still be met and it will train the 15,000 person expeditionary brigade, although the entire brigade will not be physically located at Twentynine Palms during the training. The Marine Corps is currently conducting its environmental impact assessment and expects to release its preferred alternative for land acquisition by fiscal year 2012.

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## Conclusions

While the operational shift from Iraq to Afghanistan has not required many adjustments at the Army’s and Marine Corps’ major training facilities, both services face challenges for the future. The Marine Corps is pursuing options for acquiring land to support a recent increased requirement to train about 15,000 Marines as an integrated combat team in large-scale exercises. The Army is projecting a capacity shortfall as it seeks to expand the training for brigade combat teams at its maneuver CTCs. To address this capacity shortfall, the Army is developing exportable training capabilities, but personnel shortages could delay efforts to achieve full operational capability by 2013. The Army has not completed an assessment to determine its full range of options for meeting its future brigade combat team requirements or the risks associated with not conducting the desired number of training rotations. Until the Army develops a plan that examines all the options for meeting its brigade combat team training requirements or mitigating its capacity shortfalls, it will not be able to fully implement ARFORGEN. Further, the Army’s brigade combat teams face uncertainties concerning their ability to conduct CTC rotations or receive support from the Exportable Training Capability and may need to conduct some type of alternative training. In

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addition, while the Army has identified its training requirements and locations for its smaller reserve-component units that will be deploying for ongoing operations, it has not finalized the training requirements for its smaller reserve-component units that will serve as contingency forces, including where or when these contingency forces should be trained. As a result, the Army does not know if its existing training capacity can support these smaller units as they transition through the ARFORGEN training cycle to meet future training requirements. Until the Army finalizes its reserve-component training strategy it will not be able to determine whether it can leverage existing capacities to meet future reserve-component training requirements, or whether any excess reserve-component training capacity exists.

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## Recommendations for Executive Action

We recommend that the Secretary of Defense take the following two actions:

- To address the challenges associated with training its brigade combat teams for both ongoing operations and a fuller range of missions, direct the Secretary of the Army to develop and implement a plan to evaluate the full range of available options for training its brigade combat teams; assess the risks of not conducting the desired number of training rotations; and determine how, if necessary, risks will be mitigated.
- To maximize the use of existing resources, direct the Secretary of the Army to finalize the training requirements for smaller reserve-component units that will act as contingency forces under its Army Force Generation (ARFORGEN) model. The completed training requirements should identify when smaller units' training should occur and include an analysis of existing Army training capacity to determine whether any excess capacity exists. Specifically, the analysis should weigh the costs and benefits of using the training capacity that currently exists at the Army's mobilization training centers in conjunction with or as alternatives to its other efforts, such as the home station culminating training events.

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## Agency Comments and Our Evaluation

In written comments on a draft of this report, DOD concurred or partially concurred with our recommendations. Specifically, DOD partially concurred with our recommendation that the Secretary of Defense direct the Secretary of the Army to address the challenges associated with training its brigade combat teams for both ongoing operations and a fuller range of missions by developing and implementing a plan to evaluate the

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full range of available options for training its brigade combat teams; assessing the risks of not conducting the desired number of training rotations; and determining how, if necessary, risks will be mitigated. In its comments, DOD recognized its shortfall in maneuver Combat Training Center (CTC) capacity to execute its brigade combat team training strategy and meet global force requirements. DOD stated that in January 2010, the Army initiated a Collective Training Comprehensive Review to identify and evaluate brigade combat team training options with a specific focus on the roles and requirements between home stations and CTCs in the training strategy. DOD noted that it will discuss the review's findings and recommendations during an upcoming Army Training and Leader Development Conference, and develop consensus on future adjustments to the training strategy or CTC Program based on acceptable levels of risk. DOD further noted that the Army agrees a risk and mitigation plan is required to address CTC capacity shortfalls. However, it believed that including table 1 in the report, which describes the current and potential Army maneuver CTC training rotation requirements under various deployment scenarios, was inappropriate. Specifically, DOD believed including the table suggests that the Army should mitigate CTC capacity shortfalls with longer deployments. While it noted that longer deployments would mitigate shortfalls, the Army must consider other factors, including stress on the force. We agree that the Army must consider a number of factors, including deployment length and deployment to time-at-home ratios, to identify the training capacity required at its CTCs. By including the table we are not suggesting that the Army increase deployment lengths. Rather, as noted in the report, the table is presented to illustrate the effect of various deployment lengths, which the Army has used in the past, on the number of required training rotations. However, in light of DOD's comments, we have clarified the text further to emphasize that the table is illustrative and does not reach any conclusions on any of these scenarios.

DOD concurred with our second recommendation that the Secretary of Defense direct the Secretary of the Army to finalize the training requirements for smaller reserve-component units that will act as contingency forces under its Army Force Generation (ARFORGEN) model. DOD noted that the Army is currently addressing these issues and has been executing a number of mitigating efforts to address training challenges, such as the Collective Training Comprehensive Review, which is intended to review all Army collective training requirements and analyze capacity to determine how best to maximize home-station and the CTCs' abilities for all Army components. DOD further stated that the Army is reviewing the training requirements and readiness goals that units are expected to accomplish as they move through the ARFORGEN cycle.

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DOD noted that the Army has just completed the staffing process for a new Army regulation on ARFORGEN, AR 525-XX, which establishes a cyclic process to generate trained, ready units for full-spectrum operations. This Army regulation is supported by AR 350-xx, Reserve Component Training under ARFORGEN, which is under staff review and will address the reserve-component specific issues associated with executing full-spectrum operations training under ARFORGEN. Further, DOD noted that the Army is working with the Assistant Secretary of the Army for Manpower and Reserve Affairs, the National Guard Bureau, and the U.S. Army Reserve Command to address specific issues related to operationalizing the reserve component, such as contiguous training policies and the best use of all Army training capacity. Additionally, DOD stated that the Army has validated the Army National Guard's Exportable Combat Training Capability, which provides home station culminating training events for all types of units, and the Army Reserve's Combat Support Training Center, which is executed at three Army Reserve sites.

The full text of DOD's written comments is reprinted in appendix III.

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We are also sending copies of this report to the Secretary of Defense. In addition, this report will be available at no charge on the GAO Web site at <http://www.gao.gov>.

Should you or your staff have any questions concerning this report, please contact me at (202) 512-9619 or [pickups@gao.gov](mailto:pickups@gao.gov). Contact points for our Offices of Congressional Relations and Public Affairs may be found on the last page of this report. Key contributors to this report are listed in appendix IV.



Sharon L. Pickup, Director  
Defense Capabilities and Management

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# Appendix I: Scope and Methodology

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To assess the extent to which the Army and Marine Corps have made adjustments at their major training facilities to support larger deployments to Afghanistan while still preparing forces for deployments to Iraq, we reviewed Army and Marine Corps training policies and guidance, such as Army regulation 350-50, Combat Training Center Program, the Army's Combat Training Center Master Plan, and the Marine Corps' OIF/OEF Predeployment Training Continuum, and Marine Corps Order 3502.6, Marine Corps Force Generation Process. In addition, we interviewed officials at the Department of the Army—Training Directorate; U.S. Army Forces Command; U.S. Army Training and Doctrine Command; First U.S. Army; U.S. Army National Guard; U.S. Army Reserve Command; Marine Corps Plans, Policies, and Operations—Ground Combat Element Branch; Marine Corps Training and Education Command; Marine Forces Command; and Marine Forces Reserve regarding adjustments that were required at the Army and Marine Corps major training facilities to support deployment to Iraq and Afghanistan. We also reviewed the U.S. Army Forces Command's Predeployment Training Guidance for Follow-on Forces Deploying in Support of Southwest Asia, which outlines the training requirements for Iraq and Afghanistan, to identify differences in training requirements between Iraq and Afghanistan, and interviewed Army officials to discuss these documents. We obtained and reviewed information from the Army's and Marine Corps' major training facilities on the training they conducted in fiscal year 2009 and fiscal year 2010, through April. We also interviewed officials at the training facilities, and for the Army's mobilization training centers for the Reserve and National Guard, on the installations where the training facilities are located, to discuss how they are currently using their training facilities to train for operations in Iraq and Afghanistan. Specifically, we held discussion with officials from all four of the Army's Combat Training Centers (CTC)—Battle Command Training Program, Fort Leavenworth, Kansas; National Training Center, Fort Irwin, California; Joint Readiness Training Center, Fort Polk, Louisiana; and Joint Multinational Training Center, Hohenfels, Germany. While we met with officials from all four CTCs, we only included the three maneuver CTCs in the scope of our review, as they conduct live-fire training exercises; the fourth CTC, Battle Command Training Program, was designed to train the command element and not the entire unit, and focuses on computer-assisted training exercises. We also held discussions with officials from the Marine Corps' training facility at Twentynine Palms, California, and officials from the Army's seven mobilization training centers for the Reserve and National Guard at which the Army currently conducts training and plans to conduct training in the future, including Army Support Activity—Dix (formerly known as Fort

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Dix), Camp Atterbury, Fort Knox, Camp Shelby, Fort Hood, Fort Bliss, and Joint Base Lewis-McChord (formerly known as Fort Lewis).

In focusing our review, we also identified the Army's and Marine Corps' major predeployment training facilities; specifically the locations at which these services are conducting final mission-rehearsal exercises that include live-fire training for units deploying in support of current operations in Iraq and Afghanistan.<sup>1</sup> For the Army we focused on active and National Guard brigade combat teams, which prepare and train for deployment at the Army's maneuver CTCs. In addition, we focused on the Army's mobilization training centers, where National Guard brigade combat teams that will be split into smaller units in theater conduct training.<sup>2</sup> Because smaller-sized reserve-component units also conduct predeployment training at the Army's mobilization training centers, we included these units in the scope of this review. We did not include active-component units that do not train at CTCs, since these units generally train at different locations—their home stations where they have required training facilities and support. For the Marine Corps we focused on units training for deployment at Twentynine Palms, California, its only CTC.

To determine the extent to which the Army and the Marine Corps have developed plans to adjust training capacity, we reviewed service documentation regarding future training needs, to include the 2009 Army Campaign Plan, 2010 Army Posture Statement, 2010 National Guard Posture Statement, 2010 Army Reserve Posture Statement, the Marine Corps Vision and Strategy 2025, and the 2009-2015 Marine Corps Service Campaign Plan. To further determine the Army's future training capacity requirements at its CTCs we reviewed and assessed Army guidance for the CTCs to include the 2008 and 2010 Combat Training Center Master Plans, the 2010 Headquarters Department of the Army Execution Order for the Establishment of the Exportable Training Capability, and the 2010 Memorandum of Agreement between the U.S. Army Training and Doctrine Command and the U.S. Army Forces Command regarding the transfer of the National Training Center and Joint Readiness Training Center Operations Groups. We also obtained and reviewed guidance regarding the Army's future training requirements for smaller units to include the 2009 Army Training Strategy, the 2009 ARFORGEN Training Support for an

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<sup>1</sup>Mission-rehearsal exercises are the final collective training event units conduct prior to deployment.

<sup>2</sup>The U.S. Army Reserve does not have brigade combat teams.

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Operational Reserve (Coordinating Draft), First Army Command Training Guidance for Fiscal Years 2009 and 2010, and the 2008 First Army Operations Order, which provides command guidance for mobilization, training, validation, and deployment. In addition, we reviewed Marine Corps guidance regarding its expanded training requirements at Twentynine Palms, including the 2010 Marine Corps Force Generation Process, 2009 Marine Expeditionary Brigade Objective and Threshold Training Requirements, the Marine Corps Vision and Strategy 2025, the 2009-2015 Marine Corps Service Campaign Plan, and the 2004 Marine Corps Expeditionary Brigade Exercise Study by the Center for Naval Analysis.

In addition, we reviewed Department of Army information outlining the number of training rotations that the Army will need at its maneuver CTCs to support its identified Army Force Generation (ARFORGEN) requirements for 72 brigade combat teams based on a time-deployed to time-at-home ratio of 1:2 for the active-component brigade combat teams and 1:4 for the reserve-component brigade combat teams. To determine the number of rotations needed under the Army's ARFORGEN model portraying a lower deployment demand of 1:3 time-deployed to time-at-home ratio for active-component brigade combat teams and 1:5 for reserve-component brigade combat teams, we applied the Department of Army's data regarding total rotations required under the ARFORGEN cycle. Based on the time-deployed to time-at-home ratio of 1:3 and 1:5 for active- and reserve-component brigade combat teams, respectively, we determined that a total of 28-29 training rotations would be required annually. We developed an additional ARFORGEN model scenario based on deployments of 6 months—similar to how the Army deployed in support of missions before September 2001—but still maintained a time-deployed to time-at-home ratio of 1:3 for the active component and 1:5 for the reserve component. The total number of required rotations under this ARFORGEN cycle would increase to 53-54 annually.

To assess the extent to which challenges existed for the Army in meeting its future training requirements for brigade combat teams, we compared the total number of training rotations that the Army can conduct annually at its maneuver CTCs to the desired number of rotations it would conduct under its force generation cycle—ARFORGEN. The Army has identified a rotation shortage and developed plans to mitigate this shortage through its Exportable Training Capability. However, in examining the Exportable Training Capability we found that the Army would still have a shortage of training rotations to meet the future training requirements called for in the Army's Force Generation model. We interviewed officials with the



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Department of the Army, the Combat Training Center Directorate, U.S. Army Forces Command, the Army's three maneuver CTCs, and the Exportable Training Capability at the National Training Center regarding the likelihood of this capability meeting its current timelines and milestones and the availability of risk assessments or plans to assist the Army in conducting its desired number of training rotations in the future. In addition, to determine if the Army's reserve component faced challenges in meeting its future training requirements as prescribed in the ARFORGEN model, we interviewed officials within the Department of the Army, U.S. Army Forces Command, First Army, the Army National Guard Bureau, and U.S. Army Reserve Command to determine if there is an Army policy identifying when and where the training of reserve-component contingency forces would occur within the ARFORGEN model. Further, we interviewed officials to determine the availability of existing Army resources, including the Army's mobilization training centers for the Reserve and National Guard, to support future requirements. In addition, we reviewed First Army's preliminary review detailing the availability of the Army's mobilization training centers to conduct training for contingency forces. We interviewed Marine Corps officials within the Marine Corps Training and Education Command to discuss their recently established training requirement; specifically to discuss the lessons learned that prompted this requirement. Further, we interviewed officials at Marine Corps Forces Command; Marine Corps Plans, Policies, and Operations; and the Marine Corps Air Ground Task Force to obtain further information regarding future training requirements and training capacity at Twentynine Palms. We also reviewed documents, such as the Marine Corps 2010 Proposed Land Acquisition and Airspace Establishment in Support of Large Scale Marine Air Ground Task Force Live Fire and Maneuver Training public information briefing, to obtain information regarding the Marine Corps land-acquisition timelines and alternatives to meet its new training requirement.

We assessed the reliability of the data presented in this report. Specifically, with regard to capacity—the maximum number of training rotations that can be conducted, or people that can be trained, on a sustainable basis—we interviewed officials and obtained data from the Army's and Marine Corps' headquarters organizations. In addition, we interviewed officials and obtained data from the major training facilities to verify that these data were consistent with the data provided by the headquarters organizations. We found the data to be sufficiently reliable for the purposes of this report.

In conducting this work, we contacted appropriate officials at the organizations outlined in table 2.

**Table 2: Organizations Interviewed during Our Review**

<b>Office of the Secretary of Defense</b>	<ul style="list-style-type: none"> <li>Office of the Undersecretary of Defense (Personnel and Readiness), Arlington, Virginia</li> <li>Deputy Under Secretary of Defense for Readiness, Arlington, VA</li> </ul>
<b>U.S. Army</b>	<ul style="list-style-type: none"> <li>Office of the Deputy Chief of Staff, G-3/5/7, Arlington, Virginia</li> <li>U.S. Army Training and Doctrine Command, Fort Monroe, Virginia</li> <li>U.S. Army Forces Command, Fort McPherson, Georgia</li> <li>Joint Multinational Training Command, Grafenwoehr, Germany</li> <li>U.S. Army Europe, Heidelberg, Germany</li> <li>Army National Guard, Arlington, Virginia</li> <li>U.S. Army Reserve Command, Fort McPherson, Georgia</li> <li>First Army, Fort Gillem, Georgia</li> <li>U.S. Army Installation Management Command, Alexandria, Virginia</li> <li>Combat Training Center Directorate, Fort Leavenworth, Kansas</li> <li>Battle Command Training Program, Fort Leavenworth, Kansas</li> <li>National Training Center, Fort Irwin, California</li> <li>Joint Readiness Training Center, Fort Polk, Louisiana</li> <li>Joint Multinational Readiness Center, Hohenfels, Germany</li> <li>Army Support Activity Dix (formerly known as Fort Dix), New Jersey</li> <li>Camp Atterbury, Indiana</li> <li>Fort Knox, Kentucky</li> <li>Camp Shelby, Mississippi</li> <li>Fort Hood, Texas</li> <li>Fort Bliss, Texas</li> <li>Joint Base Lewis-McChord (formerly known as Fort Lewis), Washington</li> </ul>
<b>U.S. Marine Corps</b>	<ul style="list-style-type: none"> <li>Headquarters Marine Corps, Plans, Policies, and Operations, Arlington, Virginia</li> <li>Marine Corps Training and Education Command, Quantico, Virginia</li> <li>Marine Forces Command, Norfolk, Virginia</li> <li>Marine Forces Reserve Command, New Orleans, Louisiana</li> <li>Marine Corps Center for Lesson Learned, Quantico, Virginia</li> <li>Marine Corps Air Ground Task Force Training Command, Twentynine Palms, California</li> </ul>

Source: GAO.

We conducted this performance audit from August 2009 to May 2010 in accordance with generally accepted government auditing standards. Those standards require that we plan and perform the audit to obtain sufficient, appropriate evidence to provide a reasonable basis for our findings and

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conclusions based on our audit objectives. We believe that the evidence obtained provides a reasonable basis for our findings and conclusions based on our audit objectives.

# Appendix II: Current Training Capacity at the Army's Major Training Facilities

As noted in table 3 below, in fiscal year 2009, the Army conducted 28 rotations, training over 120,000 people, at its three maneuver Combat Training Centers (CTC). Specifically, the National Training Center conducted 10 training rotations at Fort Irwin, California; the Joint Readiness Training Center conducted 10 training rotations at Fort Polk, Louisiana; and the Joint Multinational Readiness Center conducted 8 rotations which were split between its permanent Hohenfels, Germany, location and unit home-station locations.

**Table 3: Training Conducted at the Army's Maneuver CTCs**

Maneuver Combat Training Center (CTC)	Location	Focus	Length of training rotation (days)	Annual number of training rotations conducted	Annual number of personnel trained (fiscal year 2009) (in thousands)	Annual number of personnel trained (fiscal year 2010) (in thousands) <sup>a</sup>
National Training Center	Fort Irwin, California	Brigade combat team operations in mid- to high-intensity conflicts	18-22	10	50	21
Joint Readiness Training Center	Fort Polk, Louisiana	Brigade combat team operations from low- to high-intensity conflicts	21	10	50	20
Joint Multinational Readiness Center	Hohenfels, Germany, or unit home-station locations	Brigade combat team operations from low- to high-intensity conflicts	25	8	21	14
<b>Total</b>				<b>28</b>	<b>121</b>	<b>55</b>

Source: GAO Analysis of Army data

<sup>a</sup>Fiscal year 2010 data is partial and covers training carried out from October 2009 to April 2010.

As shown below in table 4, in fiscal year 2009, the Army's mobilization training centers for the Reserve and National Guard trained nearly 89,000 servicemembers for deployment.

**Appendix II: Current Training Capacity at the  
Army's Major Training Facilities**

**Table 4: Training Conducted at the Army's Mobilization Training Centers for the Reserve and National Guard**

<b>Location</b>	<b>Primary mission trained</b>	<b>Annual number of personnel trained (fiscal year 2009)</b>	<b>Annual number of forces trained (fiscal year 2010)</b>
Army Support Activity-Dix, <sup>a</sup> New Jersey	Civil affairs, psychological operations	10,980	5,493
Fort Knox, Kentucky <sup>b</sup>		0	0
Camp Atterbury, Indiana <sup>c</sup>	Kosovo forces, provincial reconstruction teams	9,744	6,187
Camp Shelby, Mississippi	Brigade combat teams	16,112	7,066
Fort Hood, Texas	Sustainment, aviation	7,728	4,499
Fort Bliss, Texas	Detainee operations, military police	7,678	7,120
Joint Base Lewis-McChord, <sup>d</sup> Washington	Medical, multinational force and observers	8,800	4,079
Fort McCoy, Wisconsin	Engineering, finance	16,010	4,196
Fort Stewart, Georgia	Brigade combat teams	6,605	0 <sup>e</sup>
Fort Sill, Oklahoma	Aviation	5,306	2,249
<b>Total</b>		<b>88,963</b>	<b>40,899</b>

Source: First Army.

<sup>a</sup>Army Support Activity Dix was formerly known as Fort Dix.

<sup>b</sup>As of April 2010, Fort Knox had not begun conducting training rotations for operations.

<sup>c</sup>Reserve-component mobilization training centers that train brigade combat teams.

<sup>d</sup>Joint Base Lewis-McChord was formerly known as Fort Lewis.

<sup>e</sup>Reserve-component mobilization training was not conducted at Fort Stewart in fiscal year 2010.

# Appendix III: Comments from the Department of Defense

Note: Page numbers in the draft report may differ from those in this report.



PERSONNEL AND  
READINESS

OFFICE OF THE UNDER SECRETARY OF DEFENSE  
4000 DEFENSE PENTAGON  
WASHINGTON, D.C. 20301-4000

JUL 2 2010

Ms. Sharon L. Pickup  
Director, Defense Capabilities and Management  
U.S. Government Accountability Office  
441 G Street, NW  
Washington, DC 20548

Dear Ms. Pickup:

This is the Department of Defense Response to the Government Accountability Office Draft Report, GAO-10-720, "Military Training: Army and Marine Corps Face Challenges to Address Projected Future Requirements, dated May 28, 2010 (GAO code 351387)." We thank you for the opportunity to comment. Regarding the recommendations, we partially concur with recommendation 1 and concur with recommendation 2. Elaboration on these positions is in the enclosure appended to this letter.

Sincerely,

Samuel D. Kleinman  
Deputy Under Secretary of Defense  
Readiness

**GAO DRAFT REPORT DATED MAY 28, 2010  
GAO-10-720 (GAO CODE 351387)**

**"MILITARY TRAINING: ARMY AND MARINE CORPS FACE  
CHALLENGES TO ADDRESS PROJECTED FUTURE REQUIREMENTS"**

**DEPARTMENT OF DEFENSE COMMENTS  
TO THE GAO RECOMMENDATIONS**

**RECOMMENDATION 1:** The GAO recommends that the Secretary of Defense direct the Secretary of the Army to develop and implement a plan to evaluate the full range of available options for training its brigade combat teams; assess the risks of not conducting the desired number of training rotations, and determine how, if necessary, risks will be mitigated. (See page 24/GAO Draft Report.)

**DoD RESPONSE: Partially Concur**

(1) The DoD recognizes its shortfall in maneuver CTC capacity to execute our BCT training strategy and meet global force requirements. In January 2010, the Army initiated a Collective Training Comprehensive Review to identify and evaluate BCT training options with a specific focus on the roles and requirements between home stations and CTCs in the training strategy. We will discuss the Collective Training Comprehensive Review's findings and recommendations during our Army Training and Leader Development Conference from 13-14 July 2010, and develop consensus on future adjustments to our training strategy or CTC Program based on acceptable levels of risk. The GAO report already highlights how the Army is currently mitigating the maneuver CTC capacity shortfall using scheduling priority on page 19.

(2) Again, the Army concurs that a risk assessment and mitigation plan is required to address CTC capacity shortfalls. However, the inclusion of Table 1 (page 14) is inappropriate. Table 1 correlates longer BCT Boots-On-Ground (BOG) lengths with decreased CTC capacity requirements. The inclusion of this table suggests that the Army should mitigate CTC capacity shortfalls by requiring units to deploy for longer periods of time. Using longer BOG lengths would mitigate CTC capacity shortfalls, but the Army has to consider many other factors, including stress on the force, in any decision that alters BOG lengths. The Army non-concurs with Table 1 and requests that it be deleted. Omitting Table 1 will allow the Army to develop a more independent, objective, and realistic mitigation plan to address CTC capacity shortfalls.

**RECOMMENDATION 2:** The GAO recommends that the Secretary of Defense direct the Secretary of the Army to finalize the training requirements for smaller

reserve component units that will act as contingency forces under its Army Force Generation model. The completed training requirements should identify when smaller units' training should occur and include an analysis of existing Army training capacity to determine whether any excess capacity exists. Specifically, the analysis should weigh the costs and benefits of using the training capacity that currently exists at the Army's mobilization training centers in conjunction with or as alternatives to its other efforts, such as the home station culminating training events. (See page 25/GAO Draft Report.)

**DoD RESPONSE: Concur**

(1) The Army is currently addressing these issues and has been executing number of mitigating efforts to address training challenges. The CSA has directed FORSCOM to conduct a Collective Training Comprehensive Review (CTCR) for the purpose of establishing a collective training enterprise nested under the Army readiness enterprise. The CTCR is looking at all Army collective training requirements and analyzing capacity in a holistic process to determine how best to maximize home station and the CTCs abilities for all Army components.

(2) The training requirements for all units are under review and pending completion through the development of "Doctrinal Training Templates". All Army units execute training based upon full spectrum operations (FSO) focused missions. FORSCOM is currently the lead agency in conducting the review and approval process for FSO doctrinal training templates for Army MTOE units. Training templates outline the major training events for all Army units throughout the ARFORGEN cycle while the Combined Arms Training Strategy (CATS) provide the training tasks to execute to meet assigned mission requirements. Doctrinal training templates establish "aim points" of readiness goals that units are expected to accomplish as they move through the ARFORGEN cycle.

(3). HQDA has just completed the staffing process for AR 525-XX "ARFORGEN" a new Army regulation that establishes a cyclic process to generate trained, ready units for full spectrum operations. AR 525-XX is supported by AR 350-XX "Reserve Component Training under ARFORGEN" (this AR is under staff review and will address the reserve component specific issues associated with executing FSO training under ARFORGEN). HQDA, FORSCOM and the RC will establish a single integrated training Plan (STIP) RC ARFORGEN training model approach that will be managed by FORSCOM through their training resources synchronization conference (TRCS) process in order to holistically synchronize all RC requirements with all available Army capacity.



(4) HQDA is working with Assistant Secretary of the Army for Manpower and Reserve Affairs (ASA –M&RA), the National Guard Bureau, and the U.S. Army Reserve Command to address specific issues related to operationalizing the RC, such as contiguous training policies and best use of all Army training capacity. These efforts support the FORSCOM CTCR and HQDA drafting of AR 350-XX.

(5) The Army has validated the ARNG eXportable Combat Training Capability (XCTC) and the USARC Combat Support Training Capability (CSTC). XCTC provides home station culminating training events for all types of units according their respective the doctrinal training templates. XCTC can be executed at over 31 ARNG training sites depending upon the size of the units trained and CSTC is executed at 3 USAR sites.

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# Appendix IV: GAO Contact and Staff Acknowledgments

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## GAO Contact

Sharon Pickup, (202) 512-9619, [pickups@gao.gov](mailto:pickups@gao.gov)

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## Staff Acknowledgments

In addition to the contact named above, key contributors to this report were Michael Ferren (Assistant Director), Jerome Brown, Susan Ditto, Kenya Jones, Lonnie McAllister, Richard Powelson, Terry Richardson, Michael Silver, and Nicole Volchko.

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